



Indiana State Department of Health

Epidemiology Resource Center

Quick Facts

About...Legionellosis

What is Legionellosis?

Legionellosis is an infection caused by *Legionella pneumophila* bacteria. The disease has two forms. Both forms can occur in persons of any age, including those who have healthy immune systems.

- Legionnaire's disease –severe respiratory infection (pneumonia) that can lead to death. Legionnaire's disease most often affects middle-aged and older persons who smoke or use tobacco containing products or who have weak immune systems.
- Pontiac Fever–mild respiratory infection that does not cause death.

Around 60 cases are reported and confirmed each year in Indiana.

What are the symptoms of Legionellosis?

The early symptoms of Legionnaire's disease include:

- fever
- chills
- lack of energy
- cough
- muscle aches
- headache
- loss of appetite
- diarrhea

Symptoms usually start about 2-10 days after exposure. Pneumonia develops after these symptoms start. Symptoms of Pontiac fever usually start about 24-48 hours after exposure but do not lead into pneumonia.

How is Legionellosis spread?

It is spread by breathing in water droplets with the bacteria. Outbreaks have been linked with exposures to contaminated water towers, evaporative condensers,

potable water systems, whirlpool spas, water faucets, showers, humidifiers, and respiratory therapy equipment. Outbreaks have occurred in hospitals, cruise ships, hotels, and other large buildings. This bacteria has also been found worldwide in creeks and ponds and soil along their banks. These bacteria reproduce in high numbers in warm, still water (90°F-105°F). The bacteria can infect the lungs and cause illness when someone inhales the water droplets with the bacteria.

Who is at risk for getting Legionellosis?

People get the disease when they breathe in a mist or vapor (small droplets of water in the air) that contains the bacteria. The bacteria are NOT spread from one person to another person.

How do I know if I have Legionellosis?

See your health care provider. Lab testing is needed to confirm a diagnosis. Your health care provider may take a sample of lung tissue, urine, or fluid from the lungs to test. Almost all people have been exposed to the bacteria in their lifetime. Therefore, it is important that lab results are looked at carefully to make sure a recent infection occurred and not a past exposure to the bacteria.

How is Legionellosis treated?

Antibiotics are sometimes used for treatment. Sometimes breathing therapy is needed to help people with breathe easier. Pontiac Fever usually requires no treatment.

How is Legionellosis prevented?

Improved design and maintenance of cooling towers and plumbing systems to limit the growth and spread of bacteria are important. Other measures include: properly maintain whirlpool tubs, hot tubs and spas, humidifiers, and decorative fountains. Clean and run them frequently to prevent growth of bacteria. Avoid inhaling water or dunking your head under water when using hot tubs and spas. Avoid using hot tubs, spas, or whirlpool tubs in public places if the water looks dirty or cloudy or if maintenance records are not maintained correctly.

All information presented is intended for public use. For more information, please refer to the Centers for Diseases and Control Prevention (CDC) Web site at:
<http://www.cdc.gov/legionella/about/index.html>

And the ISDH Indiana Infectious Disease Report located at:
<http://www.in.gov/isdh/20667.htm>

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